ABSTRACT

A method of processing medical image data includes receiving data indicative of a group of consecutive cross sectional images of a three dimensional volume being imaged. The group of consecutive cross sectional images has a first axial resolution in a z-axis direction and a first spatial resolution in x-axis and y-axis directions orthogonal to the z-axis. The method also includes transforming, such as by wavelet transforming, the group of consecutive cross sectional images in the z-axis direction to generate an axially transformed representation of the group, so that the axially transformed representation has a second axial resolution lower than the first axial resolution. The method may also include transforming the axially transformed representation in x-axis and y-axis directions to generate a spatially transformed representation. An apparatus includes processing modules for receiving data indicative of the group and transforming the group of consecutive cross sectional images in the z-axis direction, respectively.